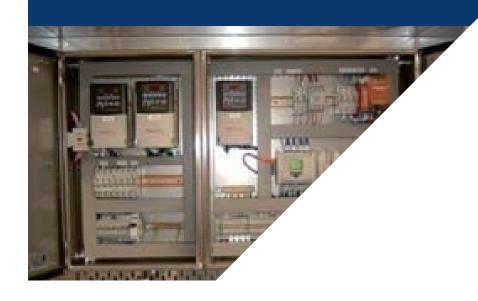


Automation and instrumentation services and solutions for industrial and municipal customers are the focus of Fyfe's Automation Division. Our highly trained engineers and technicians have many years of experience in a wide array of automation and instrumentation hardware and software.





# **FYFE AUTOMATION**

### INDUSTRIAL AUTOMATION | ELECTRICAL PROCESS CONTROLSYSTEMS | INSTRUMENTATION

### AUTOMATION SERVICES AND SOLUTIONS

- → Automation and process control system FEED
- Electrical process control functional description and topology development
- → Electrical control system detailed design and AutoCAD drafting
- PLC and HMI programming and SCADA or standalone data acquisition integration, various vendor platforms supported
- Industrial networking via various communication protocols, process and control systems integration
- Telemetry, cellular communications, remote process monitoring and control via smart phone or tablet, remote system support
- PID control loop (closed loop) implementation and tuning; advanced process control including gain scheduling
- Variable speed drive, soft starter and PLC control of motors for various industrial applications
- → Electrical safety systems, safety PLC programming and implementation (from CAT/SIL 1-4)
- Instrumentation system optimisation, smart transmitter programming, documented calibration and verification
- System commissioning, hands-on process optimisation and staff training
- → Engineering technical support, fault finding and control system problem solving
- → Electrical equipment for hazardous areas services including control system design, instrument calibration and documentation, and third party inspection

### PROCESS AND FACTORY INSTRUMENTATION

Fyfe Automation's advanced instrumentation devices and solutions include level, mass, flow, pressure, temperature and vibration monitoring and control for solids, liquids and gases with continuous and/or point operation. We specify and calibrate analytical instrumentation such as pH, EC, DO, ORP and turbidity, and are well versed with smart transmitters, particularly HART protocol. We are keen to solve difficult instrumentation and hazardous area problems.

Fyfe Automation can help you select and source the best device for your application from a range of quality instrument manufacturers. Our standardised instrument monitoring and control panels can be customised to suit your application, saving time and reducing cost.

#### **KEY INDUSTRIES**

#### RESOURCES - MINING, QUARRIES, OIL AND GAS

Fyfe Automation takes on many challenges in the resource sector in South Australia. We design and develop sequential automated process control systems, safety PLC systems, control rooms with touch screen operator interfaces, instrumentation systems for machine/process monitoring and control, machine lubrication and hydraulic automation, control of motors via soft starter and VSD control; and the PLC/HMI programs, safety and instrument systems that integrate and control one of SA's largest quarry crushing operations. Our experience extends to instrument monitoring and control systems in oil and gas plants.

## POTABLE WATER AND WASTEWATER TREATMENT

Fyfe Automation develops automated process control systems for water treatment plants. Our experience with control of mechanical and chemical treatment processes, instrumentation for water quality analysis, valves, flow

control, dosing systems, flow/level/ pressure/temperature instrumentation, pumping, dewatering, filtration, clarification and sterilisation systems allows us to offer value adding solutions.

## ORIGINAL EQUIPMENT MANUFACTURERS

Original equipment manufacturers (OEM) in Australia often operate in highly competitive sectors with global reach. In their unique control systems, design requirements often call for detailed documentation that allows for modular scalability and mass production of their equipment. Fyfe's Automation team develops control systems for OEMs who manufacture and supply capital equipment to the domestic and export markets, and thus has the knowledge to add value to OEM.

### FOOD AND BEVERAGE MANUFACTURERS

Many food and beverage manufacturing plants have modern control systems with a high degree of complexity and multiple, integrated processes. We supply instrumentation and control system solutions in continuous sequential control and batch control systems for confectionary plants, soft drink and fruit juice manufacturers, wineries, breweries and abattoirs throughout Australia. Our capabilities and tenacity in process optimisation are value adding to our customers' bottom lines.

#### MANUFACTURING, TRANSPORT LOGISTICS AND MATERIALS HANDLING

Fyfe Automation upgrades automation systems for several international and Australian transport and logistics companies. These critical automation systems include conveyor system control, state of the art laser barcode scanners, various sensing instrumentation, imbedded controllers, PLCs, multiple integrated communication protocols and systems integration with SCADA systems and IT infrastructure. Our staff also have expertise in control of advanced manufacturing processes.